

Serial No. 10/057,586

AMENDMENTS TO SPECIFICATION

[0007] One aspect of the ~~[[The]]~~ invention is directed to an apparatus for calibrating an output of an image output device and includes an image input device configured to capture the output of the image device. A test pattern generator is configured to provide a test pattern to be generated as the output of the image output device. The test pattern includes ~~at least three areas including a~~ dynamic test patch, ~~and a grating, and a fixed level area.~~ The test pattern generator is responsive to the image input device for adjusting in an intensity level of the dynamic test patch area to match an average intensity level of the grating area. ~~For example, when the image output device includes a video monitor, the image input device is a printer, the image input device may be an optical scanning device and the digitized value of each pixel may correspond to reflectance values for these areas as printed onto, for example, paper or some other medium.~~

[0013] PC 115 includes appropriate test generator software and hardware to generate an appropriate output signal to an output device to be calibrated such as video display 116 or printer 118. Typically, such output would be in the form of a bit-mapped image or equivalent, in which the image is defined by a plurality of pixels, with each pixel being assigned a value corresponding to a desired intensity level of the output. In the case of a video display, this intensity level may be a ~~luminesce~~ luminance level at a corresponding location of a video monitor such as video display 116, or, in the case of a printed output such as printer 118, a desired light reflectance level off of the target media, e.g., the paper. In the case of a color monitor, such as video display 116, the pixel values may include values for each of the primary colors. In a 16 million color system, 8 bits representing 256 values are assigned to each color per pixel. In contrast, using the CMYK (Cyan, Magenta, Yellow and Black) system, 32 bits may be divided among the four colors used in traditional color printing per printed pixel.